



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/775,484

02/10/2004

John Santhoff

028CIP-119

1051

44279 7590 06/03/2008
PULSE-LINK, INC.
1969 KELLOGG AVENUE
CARLSBAD, CA 92008

EXAMINER

VO, DON NGUYEN

ART UNIT

PAPER NUMBER

2611

MAIL DATE

DELIVERY MODE

06/03/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/775,484	Applicant(s) SANTHOFF ET AL.	
	Examiner Don N. Vo	Art Unit 2611	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 24 March 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3 and 5-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-3 and 5-21 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 03/24/2008 has been entered.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-3 and 5-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Mowery, Jr. (US 6,492,897; art of record).

Regarding claims 1, 5-11, and 14-19, Mowery, as shown in figures 1-7, teaches a system for coupling wireless signals to and from a power transmission line communication system comprising electric power wire (27), electric power outlet (28), ultra-wideband transmitter and receiver (24, 58). The coupling system of Mowery supports plurality of modulation techniques including UWB to communicate to and from the power line or power grid, which includes transformer (37), transmission substation (39), and distribution substation (38),

through the interface (58) (bridge). See also column 6, lines 38 to column 17, line 7.

Mowery fails to particularly teach communications around or bypassing a transformer or power grid. However, Mowery, as disclosed at column 15, lines 51-55, also suggests that the communication system can be attached around the power transmission line.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the system of Mowery for selectively communicating the UWB signals around or bypassing a transformer or power grid if desire since Mowery suggests attaching the system around the power transmission line. Moreover, it is noted that the independent claim 1 recites communicating “around a transformer” which is not related at all to other limitations of the claim. Therefore, it is interpreted that communicating around any transformer, which is not connected to Mowery’s system, will meet the claimed limitation. The same rationale is applied to independent claims 9, 14, and 17, which recite the UWB devices “positioned adjacent” to the power grid transformer or power grid apparatus. Of course, the communications will go around or bypassed if the power grid transformer or power grid apparatus is not connected (positioned adjacent) to the Mowery’s system.

Regarding claims 2, 3, 12, 13, 20, and 21, Mowery teaches all subject matter claimed except for specify the duration of the UWB pulse (claims 2, 12 and 20) and the power ranging (claims 3, 13 and 21) as claimed. However, to

communicate the UWB pulse having the claimed duration and power is only a matter of selecting the operational parameters for a system's need and thus, would not involve any inventive features. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the system of Mowery for communicating the UWB pulse having the claimed duration and power as long as it is still in accordance with the UWB time domain based technology (column 11, lines 11-28) since it is just one of the range that the UWB signals can be communicated.

Response to Arguments

4. Applicant's arguments with respect to claims 1, 9, 14 and 17 have been considered but are moot in view of the new ground(s) of rejection. See explanation of paragraph 3 above.

Conclusion

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Reference Tomlinson, Jr. et al (US 2003/0100288) is cited because it is pertinent to UWB communications over PLC.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Don N. Vo whose telephone number is (571) 272-3018. The examiner can normally be reached on Mon-Fri (9:00AM - 6:00PM).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, MOHAMMAD GHAYOUR can be reached on (571) 272-3021. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Don N. Vo/
Primary Examiner, Art Unit 2611